

$i \geq 1, j \geq 1$

Fig. 1

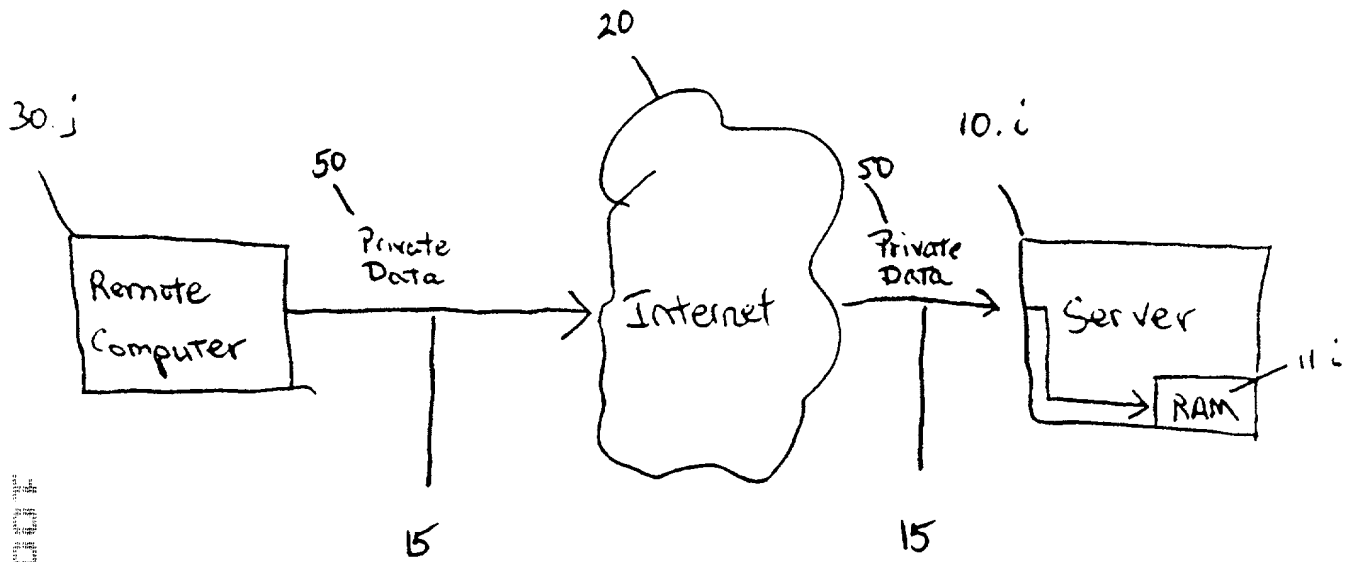


Fig. 2a

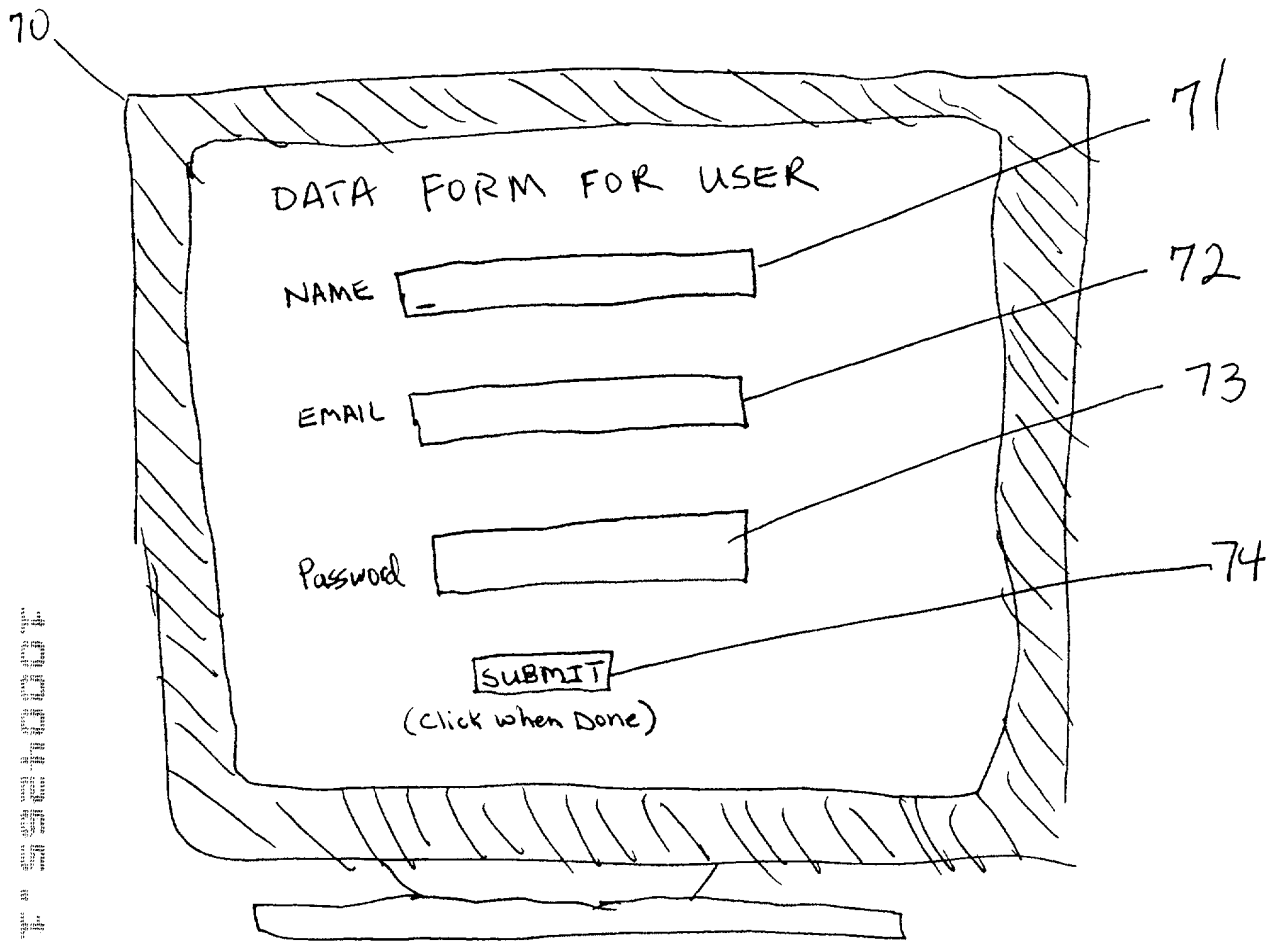


FIG. 2b

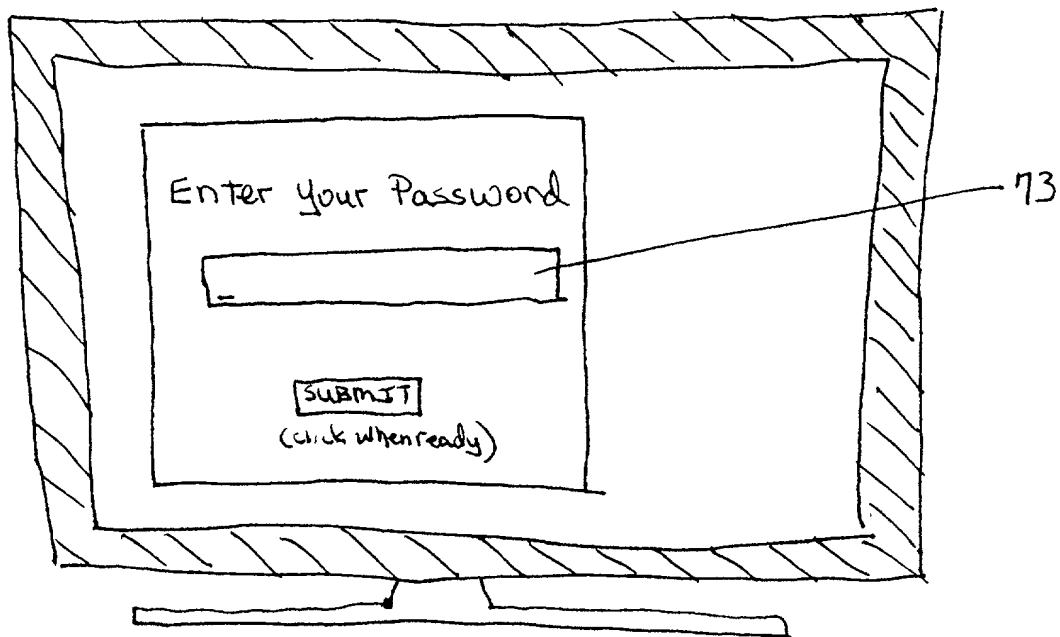
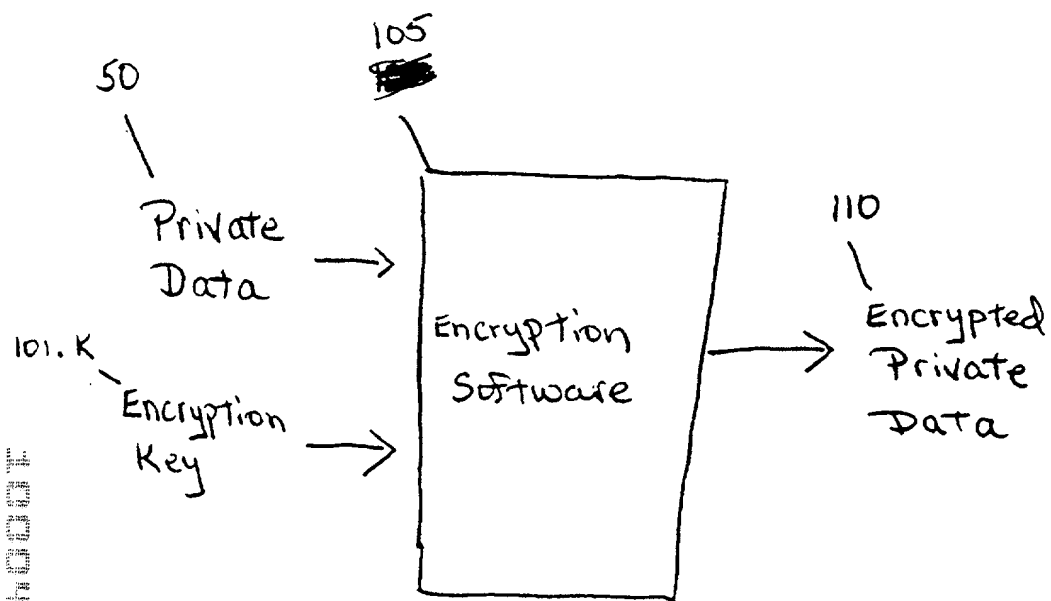


FIG. 2c



$K \geq 1$

Fig. 3

User Key 100

G	o	o	s	e		G	o	s	s	a	g	e	1	2	3
---	---	---	---	---	--	---	---	---	---	---	---	---	---	---	---

v-set 300

F	o	o	t	B	a	l	l
---	---	---	---	---	---	---	---

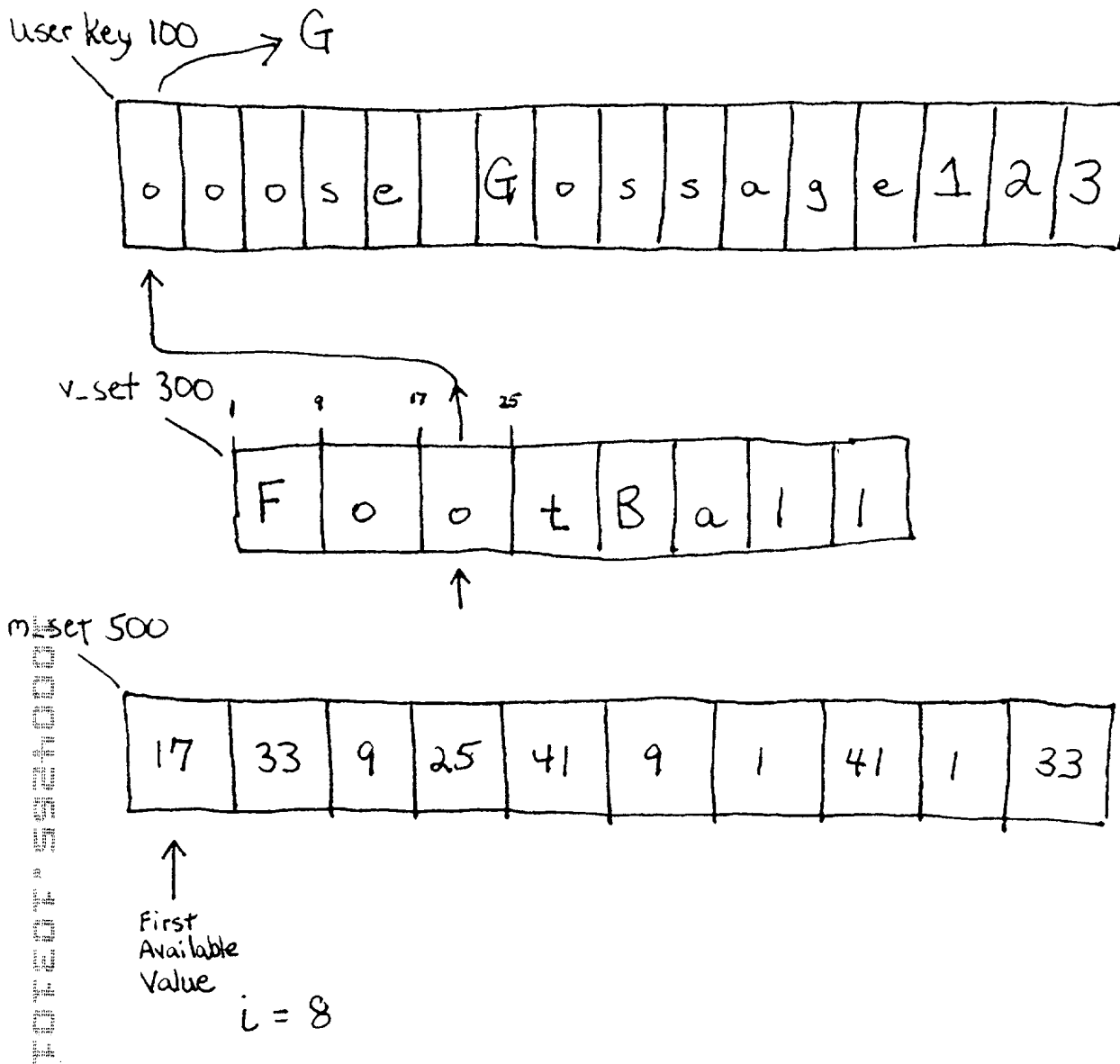
m-set 500

17	33	9	25	41	9	1	41	1	33
----	----	---	----	----	---	---	----	---	----

$$i = 8$$

$K = n * i + 1$, where $n = 0$ initially
and $n = n + 1$ after replacement

FIG. 4a (Pre-Replacement)

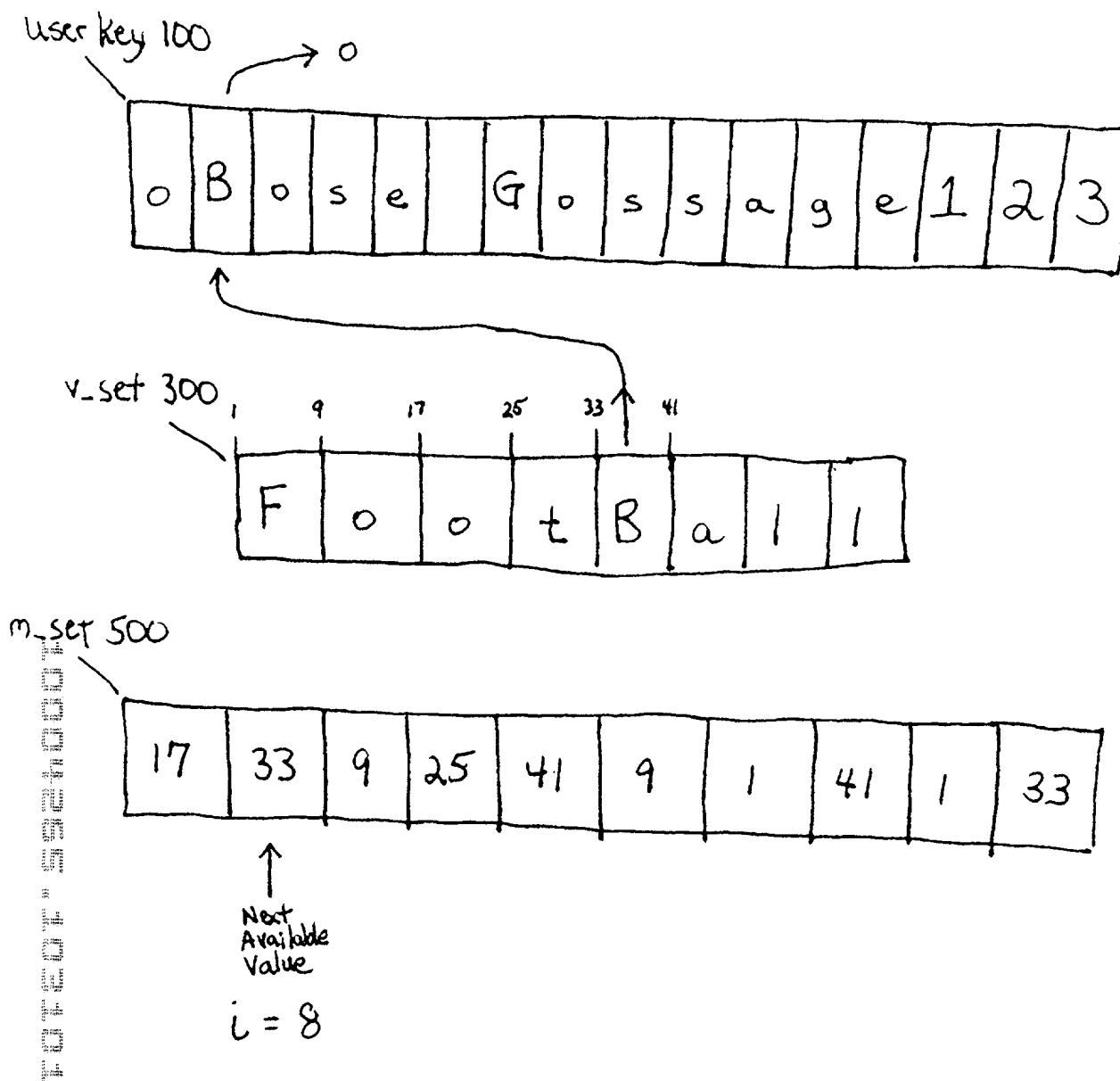


$$K = n * i + 1, \text{ where } n = 0 \text{ initially}$$

and $n = n + 1$ after replacement

K = 1

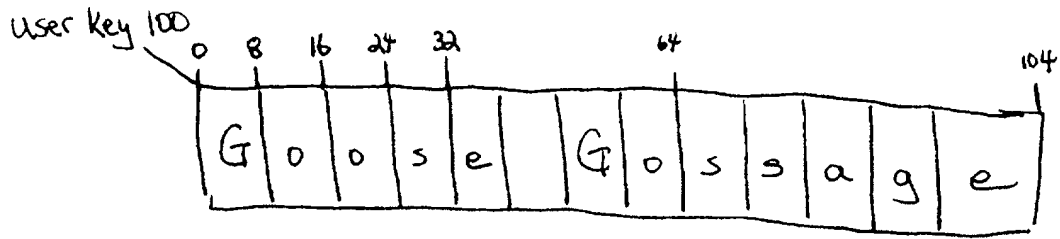
FIG. 4b (Replacement, $n = 0$)



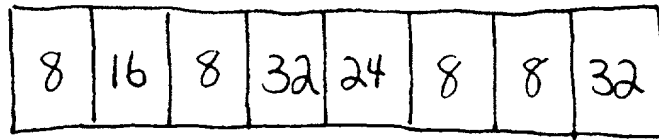
$$K = n * i + 1, \text{ where } n = 0 \text{ initially} \\ \text{and } n = n + 1 \text{ after replacement}$$

$K = 9$

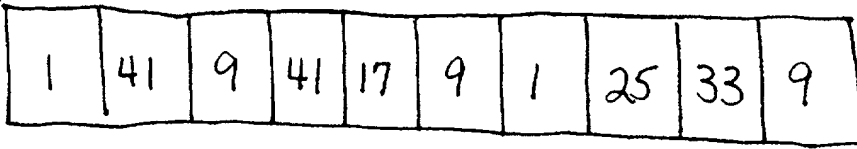
FIG. 4c (Replacement, $n = 1$)



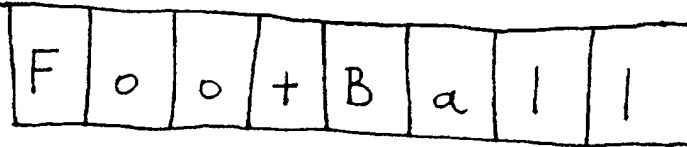
i-set 200



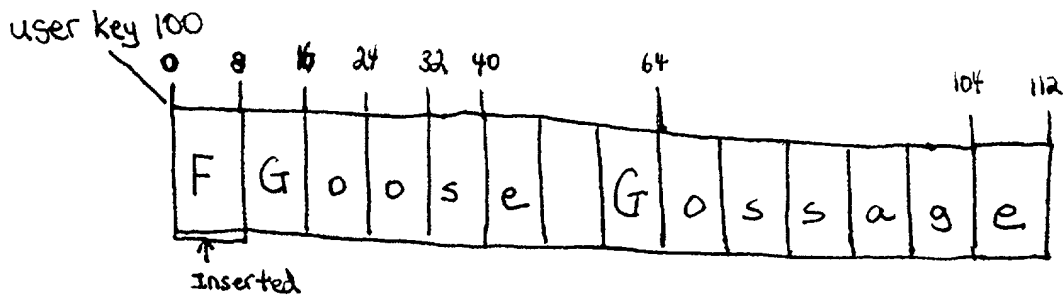
K-set 400



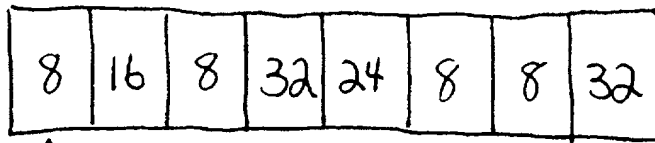
v-set 300



5a
FIG. ~~5a~~ (Pre-Insertion)

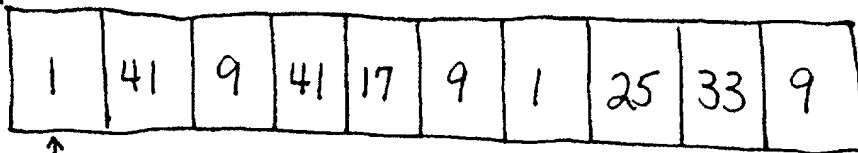


i-set 200



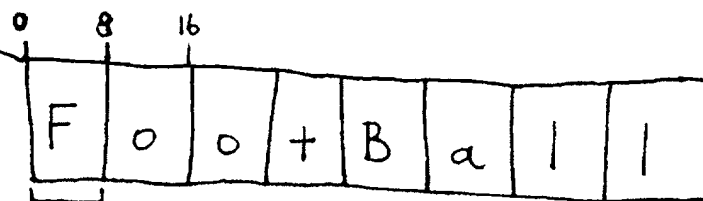
↑
First Available $\{L=8\}$

K-set 400



↑
First Available

v-set 300



↑
First Available
i bits

FIG. 5b (First Insertion)

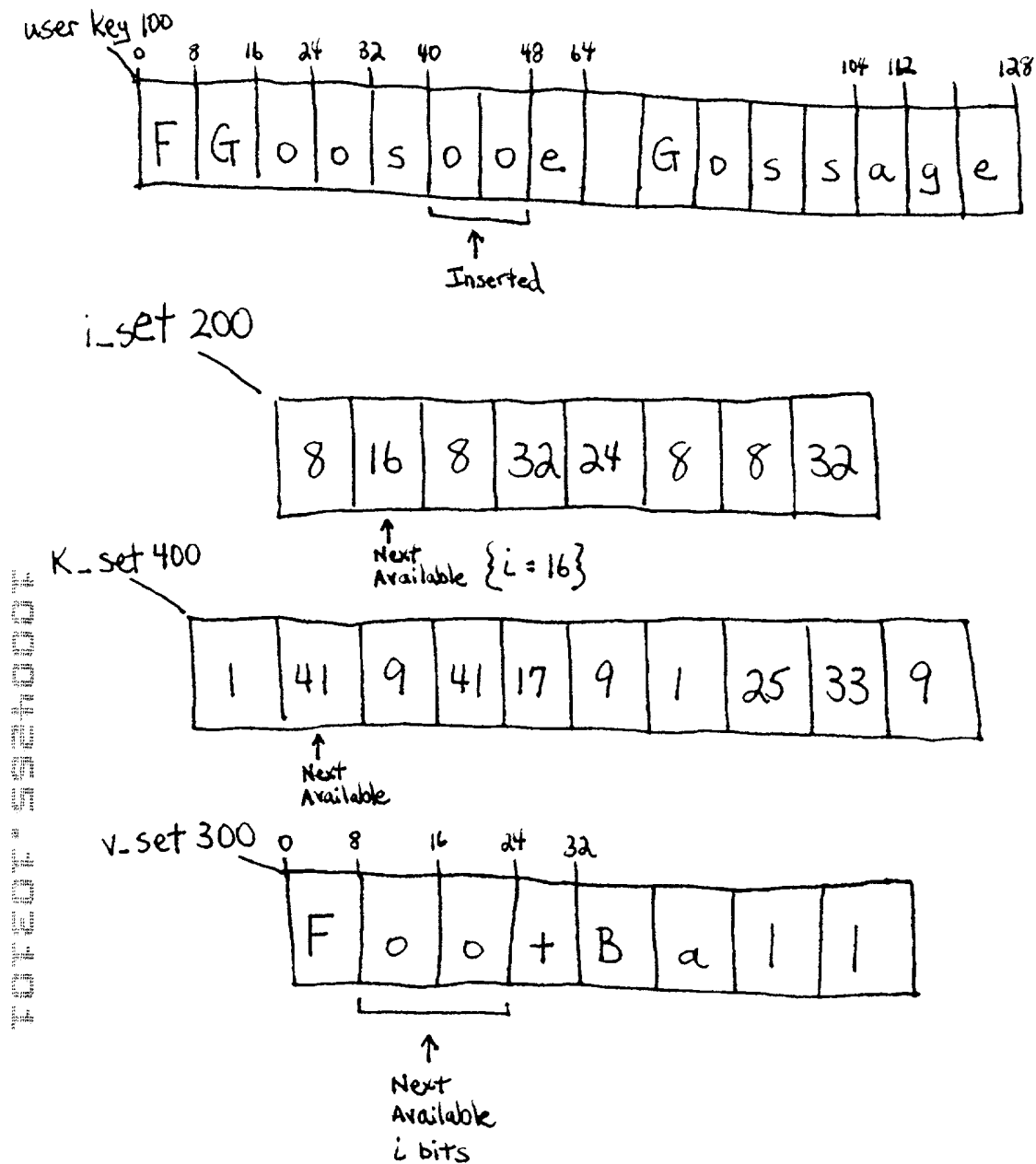
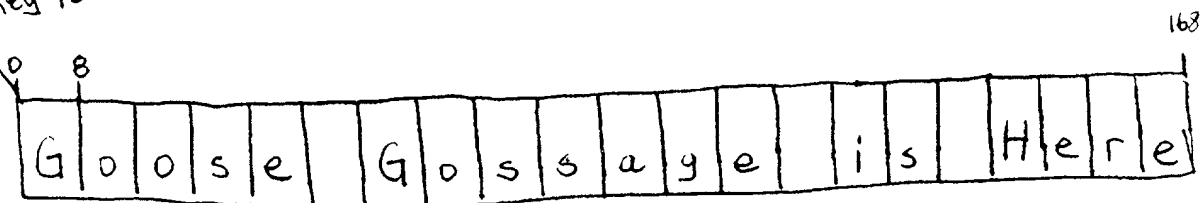
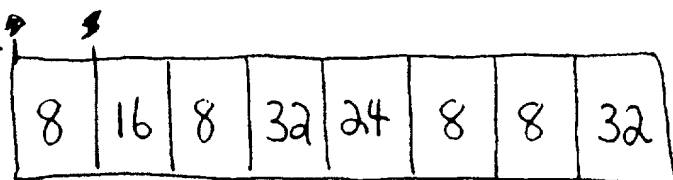


FIG. 5c (Second Insertion)

User Key 100



i_set 200



K_set 400

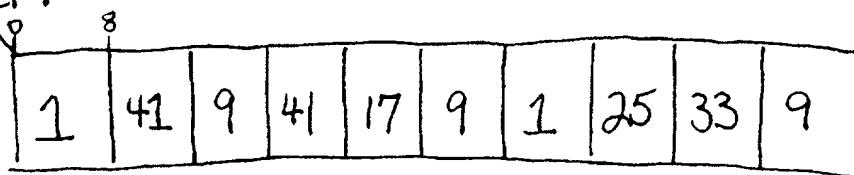


FIG. 6a (Pre-Deletion)

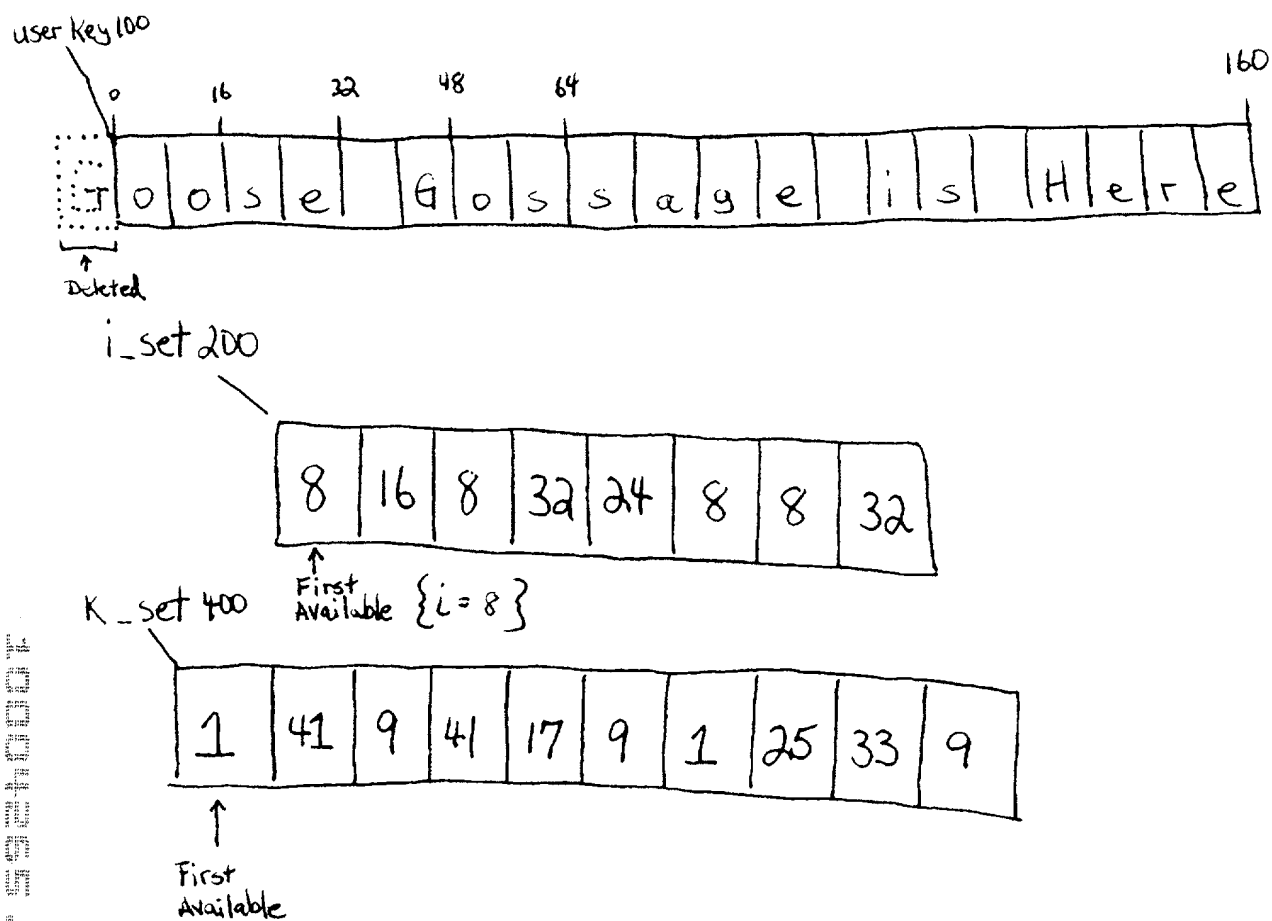


FIG. 6b (First Deletion)

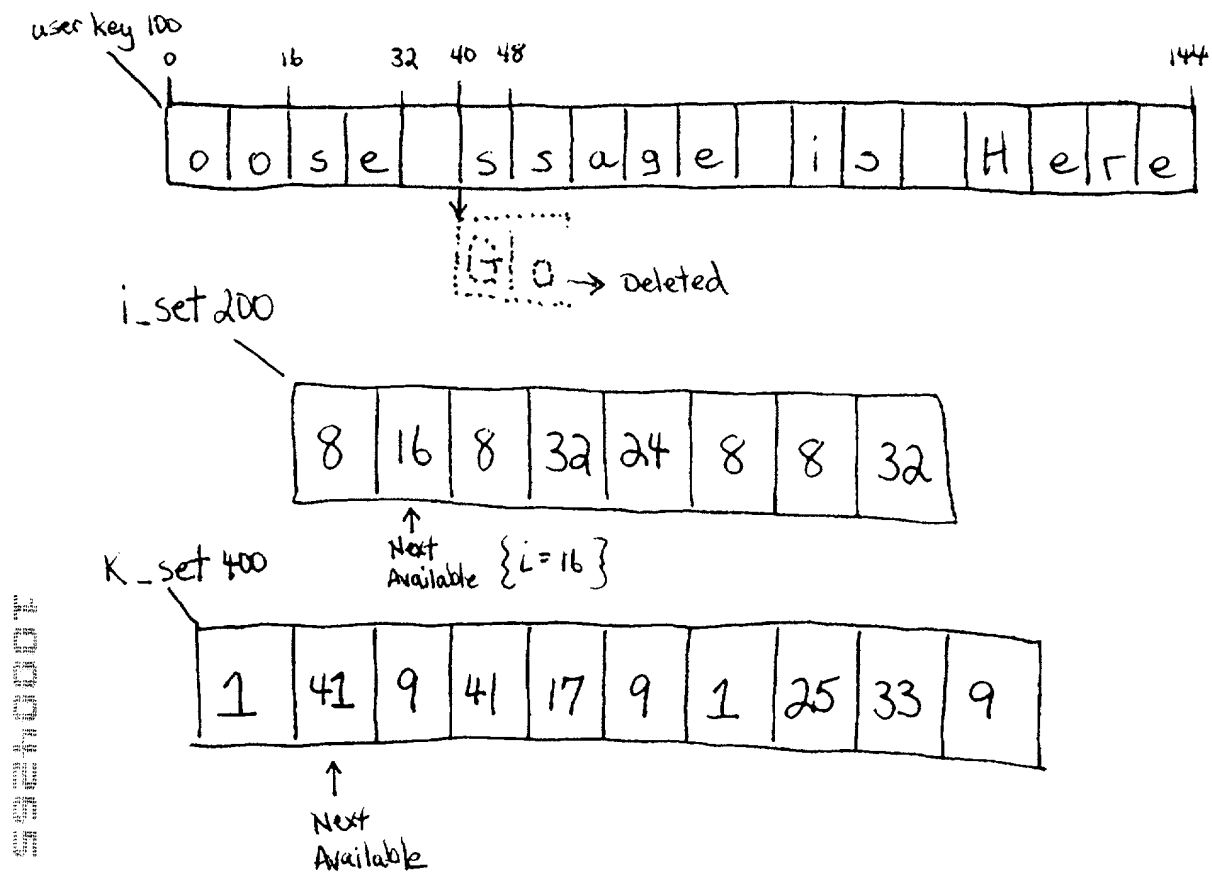
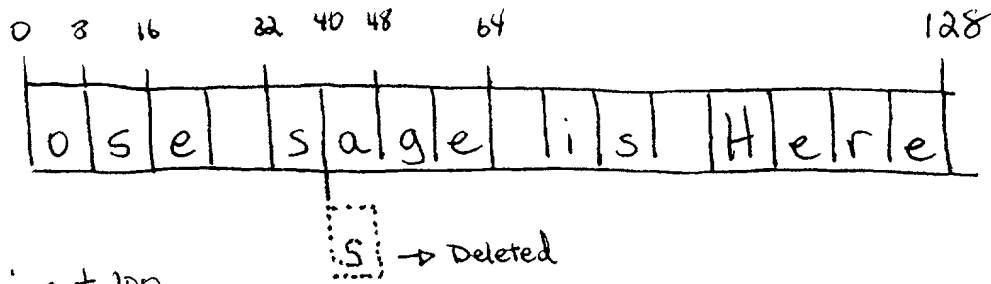
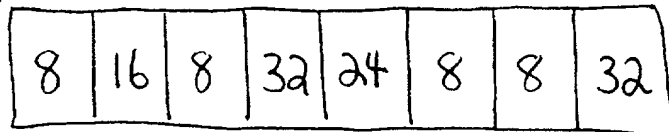


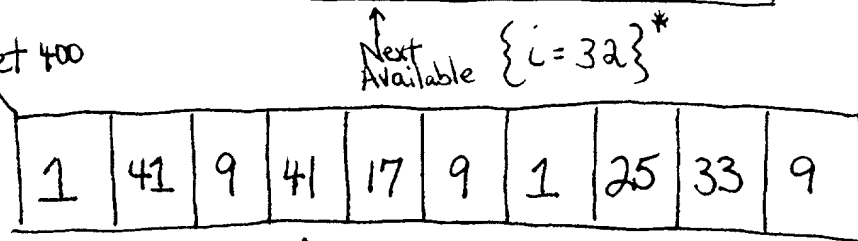
FIG. 6c (second Deletion)



i_set 200



K_set 400

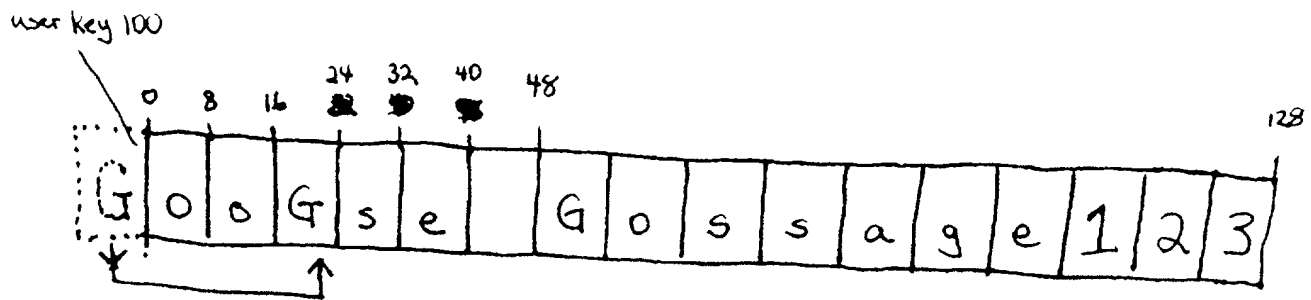


↑
Next
Available

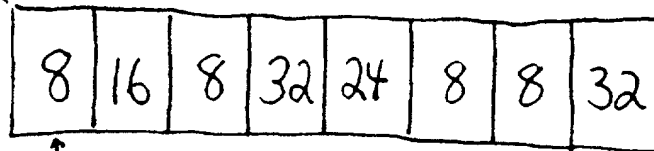
$$* \left\{ \begin{array}{l} \text{if } (u-i) < e \\ \text{then } i = i - (e - [u-i]) \end{array} \right\}$$

$$i = 32 - (128 - (136 - 32)) = 8$$

FIG. 6e (Fourth Deletion)

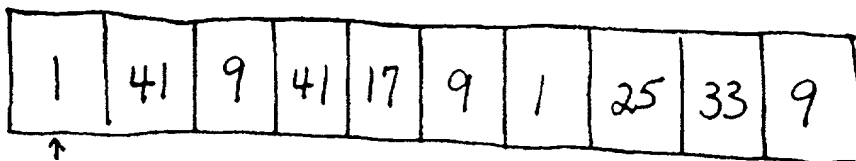


i-set 200



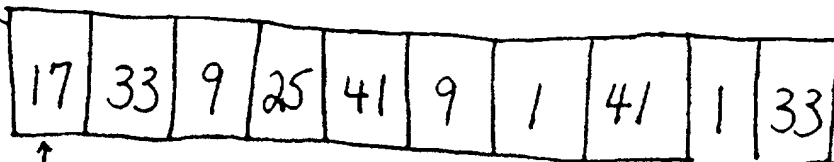
First Available $\{i=8\}$

K-set 400



First Available $\{K=1\}$

m-set 500



First Available

FIG. 7b (First Rearrangement)

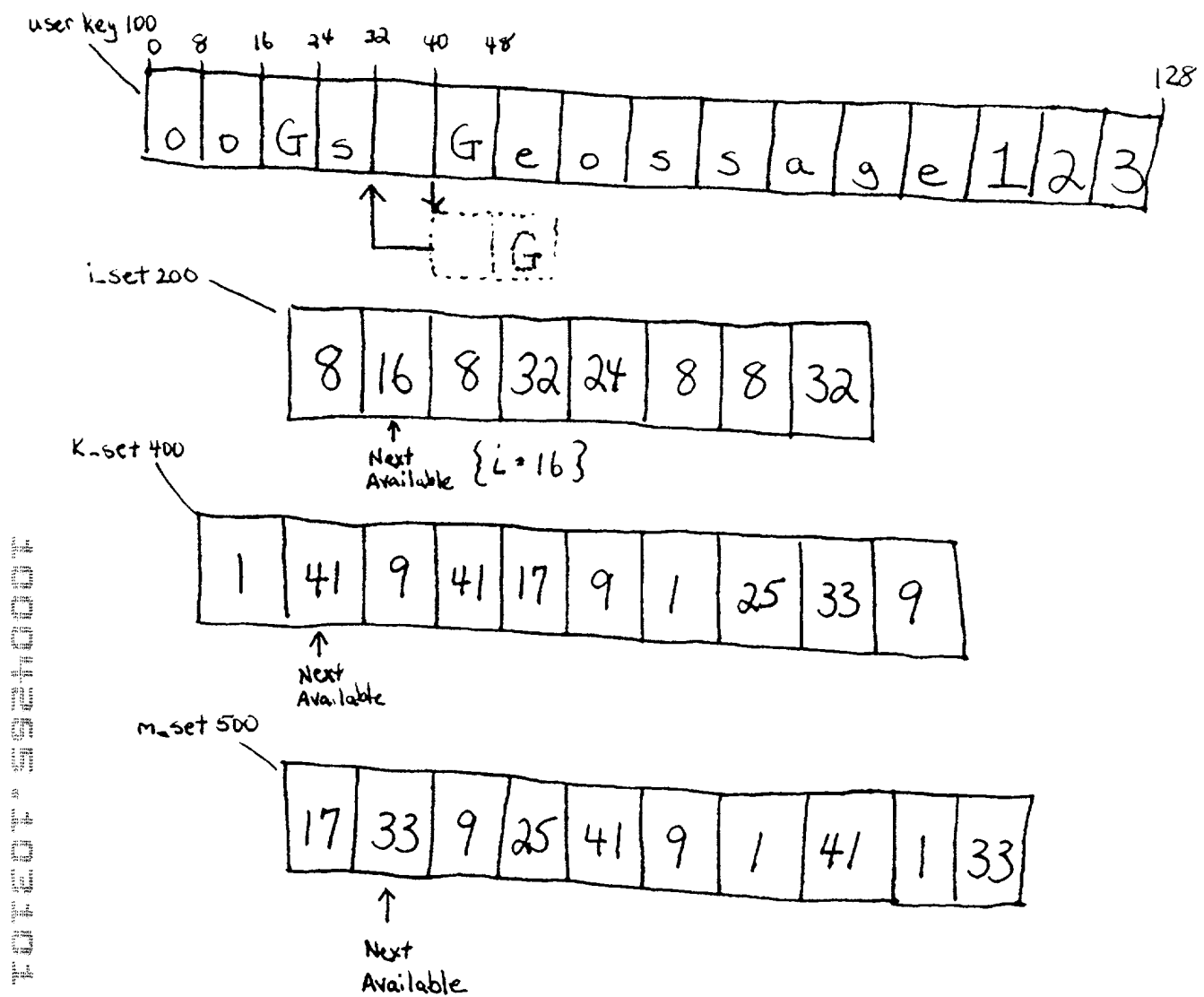


FIG. 7c (Second Rearrangement)

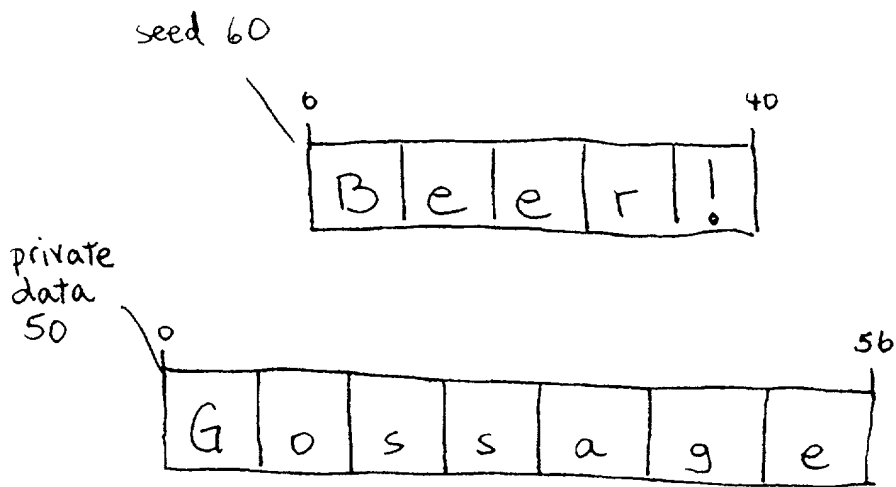


FIG. 8a (Pre-Seeded)

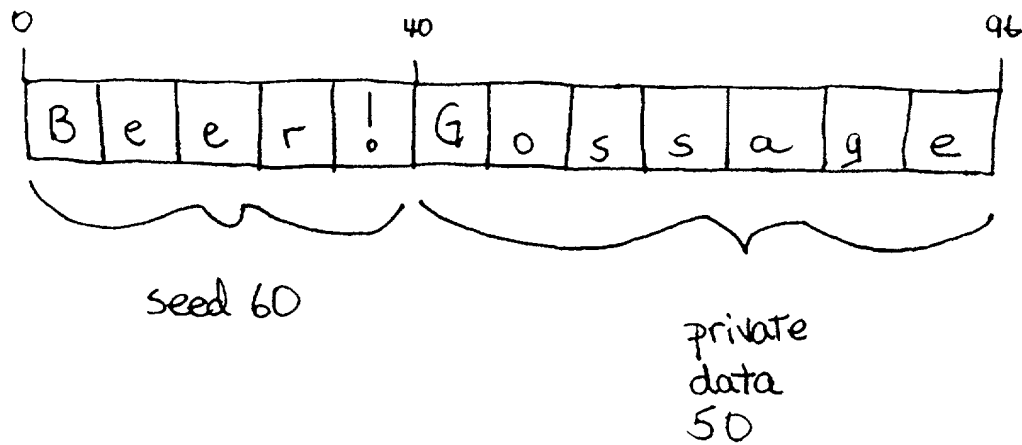


FIG. 8b (Seeded)

Cookie 300

Name	"ywi"
Value	"3/4M}7C□C÷□" alt

301 302 110

FIG. 9

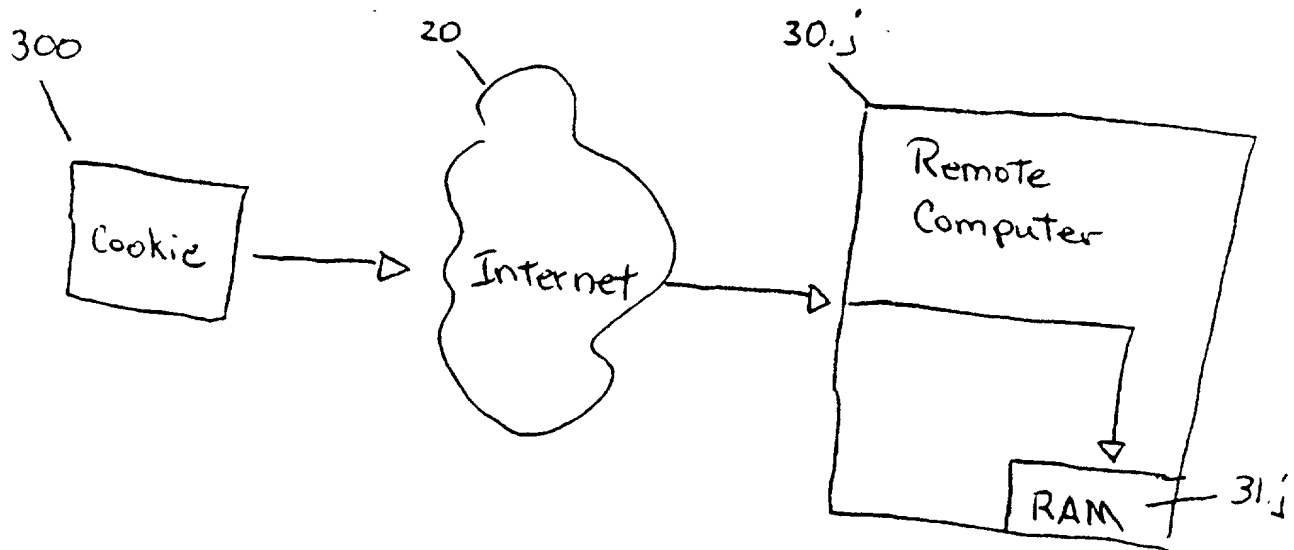


Fig. 10a

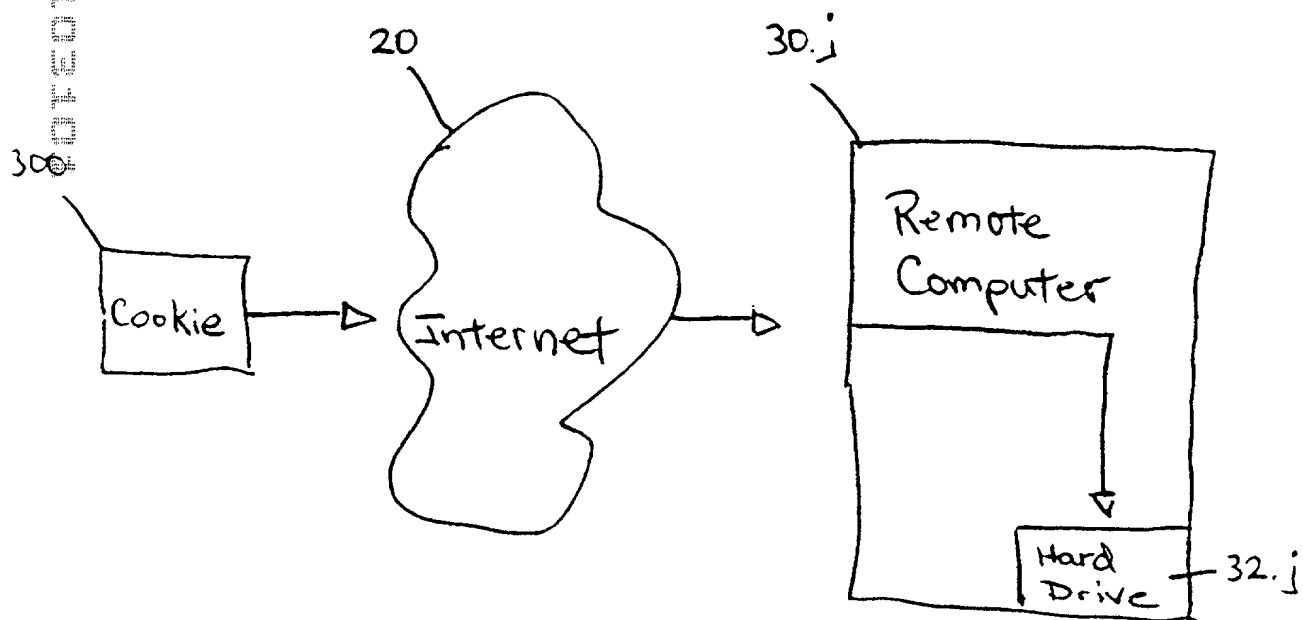


Fig. 10b

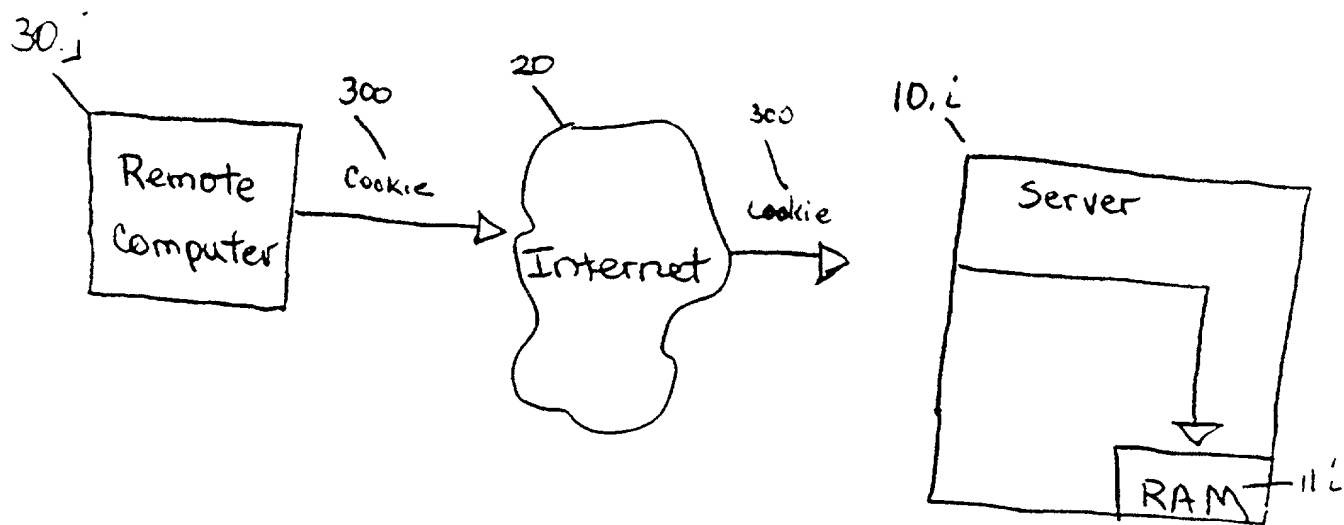
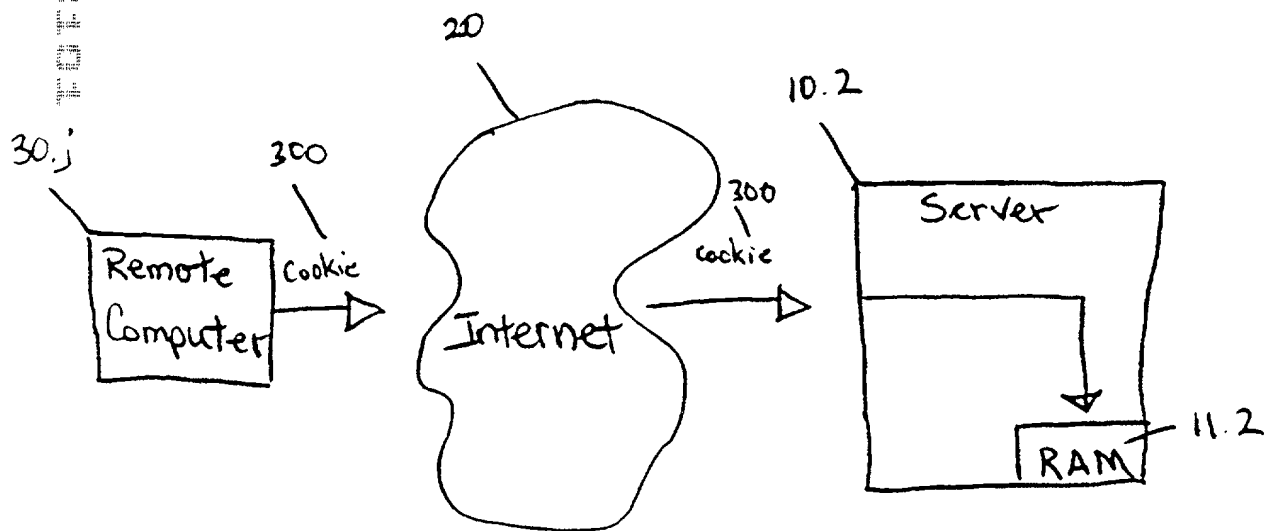


Fig. 11a

~~FIG. 11a~~



~~FIG. 11b~~ FIG. 11b

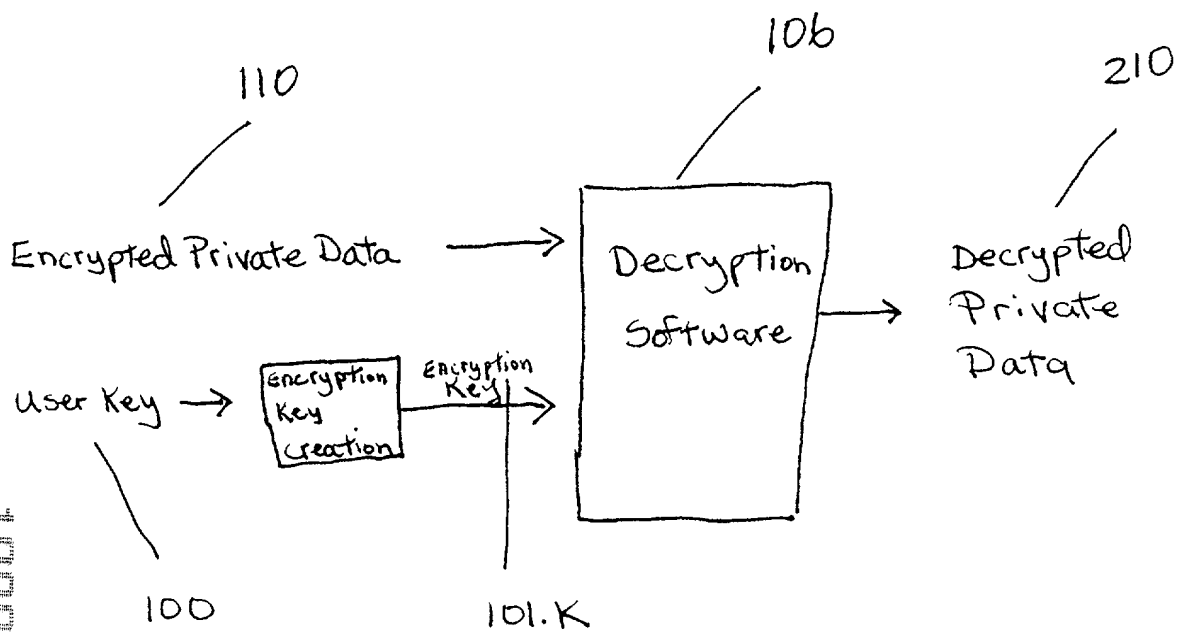


FIG. 12